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10/578,181	05/01/2006	Jay S. Walker	04-027	5212
22927 7590 06/29/2011 WALKER DIGITAL MANAGEMENT, LLC 2 HIGH RIDGE PARK STAMFORD, CT 06905				
EXAMINER				
LONG, PONYA M				
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/578,181

Applicant(s)

WALKER ET AL.

Examiner

FONYA LONG

Art Unit

3689

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 04/22/2011.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7.9-42.44 and 45 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-7.9-42.44 and 45 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-945)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

This communication is a Final Office Action rejection on the merits in response to communication received on April 22, 2011. Claims 7, 9, and 39 have been amended. Claims 8 and 43 have been cancelled. Claims 44 and 45 have been added. Claims 1-7, 9-42, 44, and 45 are currently pending and have been addressed below.

Response to Amendment

Applicant's amendments to the claims are sufficient to overcome the claim objection and 112 2nd rejection set forth in the previous office action.

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 39-42, and 44 are rejected under 35 U.S.C. 102(b) as being anticipated by Peters (5,769,269).

As per Claim 39, Peters discloses a method comprising:

identifying, by the vending machine, a transaction at the vending machine, wherein the identifying comprises:

receiving, by the vending machine, an indication of a request from a customer to purchase a unit of a product sold via the vending machine; and receiving, by the

vending machine, an indication of a payment by the customer for the requested unit of product (Col. 10, Lines 22-65, discloses receiving, by the vending machine, a selection of an item requested by a customer; and receiving, by the vending machine, credit card information or cash by the customer);

receiving, by the vending machine and after at least one of the receiving of the indication of the request for the unit of product and the receiving of the indication of the payment for the requested unit of product, an indication of a malfunction of the vending machine that has occurred with respect to the identified transaction (Col. 15, Lines 27-55, discloses receiving an indication that a wrong product was vended and prompting the customer to press the help key);

establishing, by the vending machine in response to the receiving of the indication of the malfunction, a communication link between the vending machine and a remote customer service device operated by a customer service representative (Col. 15, Lines 27-55, discloses via the customer pressing the help key and initiating communication with the CSR);

transmitting, by the vending machine and after the establishing of the communication link, information provided by the customer, to the remote customer service device operated by the customer service representative (Col. 8, Line 63-Col. 9, Line 18, discloses the CSR receiving information from the customer that he/she received the wrong product);

receiving, by the vending machine and from the remote customer service device operated by the customer service representative, and in response to the transmitting of

the information provided by the customer, an instruction to output a resolution to the customer (Col. 15, Lines 27-55, via receiving from the CSR instruction to provide a receipt to the customer indicating that a refund will be sent by mail);

wherein the resolution is based on at least one of: (i) an identity of the customer, and (ii) an assessed value of the customer (Col. 15, Lines 27-55, discloses the resolution being based on the type of payment (i.e. account information) provided by the customer); and

outputting, by the vending machine and in response to the receiving of the instruction to output the resolution to the customer, the instructed resolution to the customer (Col. 15, Lines 27-55, via the vending machine printing out the receipt indicating that a refund will be sent by mail).

As per Claim 40, Peters discloses transmitting, by the vending machine and after the establishing of the communication link, diagnostic data of the vending machine to the remote customer service device operated by the customer service representative (Col. 15, Lines 27-55, discloses the CSR receiving data that the customer received the wrong product and whether the customer paid by cash or credit card).

As per Claim 41, Peters discloses the resolution is based on the diagnostic data transmitted by the vending machine to the remote customer service device operated by the customer service representative (Col. 15, Lines 27-55, discloses the resolution being based on whether the customer paid by cash or credit card).

As per Claim 42, Peters discloses the resolution is based on the information provided by the customer and transmitted by the vending machine to the remote

customer service device operated by the customer service representative (Col. 15, Lines 27-55, discloses the CSR receiving data that the customer received the wrong product and whether the customer paid by cash or credit card, wherein the resolution is based on whether the customer paid by cash or credit card).

As per Claim 44, Peters discloses the resolution is determined automatically by the remote customer service device operated by the customer service representative based on the information provided by the customer, the diagnostic data and at least one stored rule for determining the resolution (Col. 15, Lines 27-55, discloses the CSR receiving data that the customer received the wrong product and whether the customer paid by cash or credit card. A resolution is determined based on the type of payment provided by the customer, wherein if the customer's paid by credit card then a refund will be credited to the credit card. if the customer pay by cash the customer either has the option of selecting a different product.).

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Examiner Notes: The conclusion of obviousness was established using the KSR rationale of combining prior art elements according to known methods to yield predictable results.

4. Claims 1-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of PTS: Vending Machine Refund System (May 02, 2004; herein after known as "PTS").

As per Claim 1, Walker et al. discloses a method comprising:

receiving, by a vending machine and from a customer, a request for a product to be dispensed by the vending machine, in which the request indicates a first product (Claim 1, discloses receiving a selection (i.e. a request) of a first product from the purchaser);

determining, by the vending machine, whether to provide a resolution to the customer service issue (Col. 2, Line 65-Col. 3, Line 7, discloses determining substitute products and/or services (i.e. resolutions) to offer when a selected product and/or service is unavailable (i.e. customer service issue)); and

providing, by the vending machine and to the customer, an offer for a second product that is not the first product (Claim 1, discloses offering a substitute product (i.e. second product) to the purchaser).

However, Walker et al. fails to explicitly disclose providing a plurality of selectable menu options defining a customer service issue; and, receiving, from the customer a selection of at least one of the menu options.

PTS discloses an online vending refund system with the concept providing a plurality of selectable menu options, each of which defines at least one customer service issue (discloses a vending refund form that a customer fills out, wherein the form contains selectable menu options via a drop down list to identify the date that the

customer service issue occurred, the vending machine that created the issue (via machine type), and the reason for the issue (via a reason for refund request)); and receiving, from the customer, a selection of at least one of the menu options, thereby defining an indication of a customer service issue (discloses the customer filling out the vending refund form including selecting from the menu option and submitting the form via online).

Therefore, from the teaching of PTS, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and system for providing a customer resolution when a vending machine item requested by a customer is not able to be vended as taught by Walker et al. to include providing disclose providing a plurality of selectable menu options defining a customer service issue; and, receiving, from the customer a selection of at least one of the menu options as taught by PTS in order to identify trends for certain vending machines in relation to inventory or vending machine malfunctions.

As per Claim 2, Walker et al. discloses providing an offer for one of the second product, and a refund (Abstract and Claim 1, discloses offering the substitute product (i.e. second product) to the purchaser).

As per Claim 3, Walker et al. discloses determining that a sales velocity of the second product is less than a threshold (Col. 7, Lines 30-41, discloses the suggestive sell (i.e. second product) criterion may be a requirement that the average demand for a product associated with the criterion is below a certain average demand rate).

As per Claim 4, Walker et al. discloses determining whether to provide a resolution to the customer service issue based on sales velocity of the second product (Col. 7, Lines 30-41, discloses the suggestive sell (i.e. second product) criterion may be a requirement that the average demand for a product associated with the criterion is below a certain average demand rate).

5. Claims 5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of PTS: Vending Machine Refund System (May 02, 2004; herein after known as "PTS") and in further view of Whitten et al. (7,286,901).

As per Claim 5, the Walker et al. discloses determining that the first product is unable to be dispensed from the vending machine (Col. 2, Line 65-Col. 3, Line 7, discloses receiving a selection of a first product from a purchaser and determining the availability of the first product (i.e. whether it is unable to be dispensed), if the product is not available, a substitute product is offered).

However, the Walker et al. and PTS combination fails to explicitly disclose disabling the ability to request the first product.

Whitten et al. discloses a vending system with the concept of disabling the ability to request the first product (Col. 3, Lines 15-20, discloses preventing (i.e. disabling) future vend attempts for the first ordered product until the vending machine is visited by a service person).

Therefore, from the teaching of Whitten et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al. and PTS combination to include disabling the ability to request the first product as

taught by Whitten et al. in order to help prevent cheating of the customer and further tampering.

6. Claims 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Wittern, Jr. et al. (6,772,906) in view of PTS: Vending Machine Refund System (May 02, 2004; herein after known as "PTS") and in further view of Walker et al. (6,324,520).

As per Claim 6, Wittern, Jr. et al. disclose a method comprising:

receiving, by a vending machine and from a customer, a request for a product to be dispensed by the vending machine, in which request indicates a first product (Col. 7, Lines 4-18, via a customer selecting an item form the product selection, confirmation of an authorized product selection is communicated to the controller); and

determining, by the vending machine, that the vending machine has malfunctioned (Col. 4, Lines 52-59, via if a product is not sensed by the time the motor reaches the home position during the second vend cycle, a signal can be created which can activate an indicator of a malfunction in regards to the vending machine).

Wittern, Jr. et al. disclose the concept of providing an alternative selection (i.e. second product) in response to a malfunction (Col. 4, Lines 52-59). However, Wittern, Jr. et al. fails to explicitly disclose providing a plurality of selectable menu options; receiving a selection of at least one of the menu options; determining a sales velocity of a second product; determining whether to provide a resolution to the customer service issue; and providing a compensation code.

PTS discloses an online vending refund system with the concept of providing a plurality of selectable menu options, each of which defines at least one customer

service issue (discloses a vending refund form that a customer fill out, wherein the form contains selectable menu options via a drop down list to identify the date that the customer service issue occurred, the vending machine that created the issue (via machine type), and the reason for the issue (via a reason for refund request)); and receiving, from the customer, a selection of at least one of the menu options, thereby defining an indication of a customer service issue (discloses the customer filling out the vending refund form including selecting from the menu option and submitting the form via online).

Therefore, from the teaching of PTS, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the apparatus and method for vending from a vending machine of Wittern, Jr. et al. to include providing a plurality of selectable menu options; and receiving a selection of at least one of the menu options as taught by PTS in order to identify trends for certain vending machines in relation to malfunctions.

Walker et al. discloses a method for collecting and applying vending machine demand information with the concept of determining, by the vending machine, that a sales velocity of a second product is less than a threshold (Col. 7, Lines 30-41, discloses the suggestive sell (i.e. second product) criterion may be a requirement that the average demand for a product associated with the criterion is below a certain average demand rate); determining, by the vending machine, whether to provide a resolution to the customer service issued based on the sales velocity (Col. 7, Lines 30-41, discloses the suggestive sell (i.e. second product) criterion may be a requirement

that the average demand for a product associated with the criterion is below a certain average demand rate); and providing, by the vending machine and to the customer, a compensation code that is redeemable for the second product (Figs 3-6; Col. 2, Line 65-Col. 3, Line 7, discloses a product identifier (i.e. code) being provided to the purchaser to be used by the purchaser to receive the substitute product (i.e. second product)).

Therefore, from the teaching of Walker et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Wittern, Jr. et al. and PTS combination to include determining a sales velocity of a second product; determining whether to provide a resolution to the customer service issue; and providing a compensation code as taught by Walker et al. in order to determine a adequate alternative or substitute product to provide to a customer in order to ensure customer satisfaction.

7. Claims 7, 8, 17, 19-22, and 25-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602).

As per Claim 7, Walker et al. discloses a method comprising:

receiving, via a customer interface of a vending machine and from a customer, a request for a product to be dispensed from the vending machine (Claim 1, discloses receiving a selection (i.e. a request) of a first product from the purchaser);

determining, by the vending machine and based on input received at the vending machine and from the customer, that a customer service issue exists (Col. 2, Line 65-Col. 3, Line 7, discloses determining whether the product requested by the customer is available, if it is determined that the product is unavailable a customer issue exists);

determining, by the vending machine, whether to provide a resolution to the customer service issue (Col. 7, Line 24-Col. 8, Line 2, discloses determining what product should be offered as a resolution to the purchaser based on criterion such as the average demand rate, which product is due to be restocked at the earliest date, or which product will expire at the earliest date); and providing, by the vending machine and in the case that it is determined that the resolution should be provided, the resolution to the customer (Col. 7, Lines 42-49, discloses offering the purchaser a substitute product (i.e. second product) if the product requested by the purchaser is not available).

However, Walker et al. fails to explicitly disclose determining whether to provide a resolution based on a coin inventory available.

Kolls discloses a vending machine control system with the concept of determining whether to provide a resolution based on a coin inventory available (Col. 2, Lines 29-44, discloses the concept of the coin inventory of a vending machine being depleted. Col. 23, Line 52-Col. 24, Line 13, discloses determining that an issue exists such as "out of supplies" (i.e. coin inventory depleted) and taking action to correct the problem).

Therefore, from the teaching of Kolls, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and apparatus for collecting and applying vending machine demand information of Walker et al. to include determining whether to provide a resolution based on a coin inventory available as taught by Kolls in order to aid in properly compensating a customer for the money owed to the customer and promoting customer satisfaction.

As per Claim 17, Walker et al. discloses selecting, by the vending machine and based on the coin inventory available at the vending machine, the resolution from a plurality of available resolutions (Col. 7, Line 24-Col. 8, Line 2, discloses determining what product should be offered as a resolution to the purchaser based on criterion such as the average demand rate, which product is due to be restocked at the earliest date, or which product will expire at the earliest date).

However, Walker et al. fails to explicitly disclose determining whether to provide a resolution based on a coin inventory available.

Kolls discloses a vending machine control system with the concept of determining whether to provide a resolution based on a coin inventory available (Col. 2, Lines 29-44, discloses the concept of the coin inventory of a vending machine being depleted. Col. 23, Line 52-Col. 24, Line 13, discloses determining that an issue exists such as "out of supplies" (i.e. coin inventory depleted) and taking action to correct the problem).

Therefore, from the teaching of Kolls, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and apparatus for collecting and applying vending machine demand information of Walker et al. to include determining whether to provide a resolution based on a coin inventory available as taught by Kolls in order to aid in properly compensating a customer for the money owed to the customer and promoting customer satisfaction.

As per Claim 19, Walker et al. discloses providing of the resolution to the vending machine customer comprises at least one of: a reservation of a product in a

vending machine on behalf of the customer; providing the customer with money via the vending machine; establishing a credit balance at the vending machine; applying credit toward a customer account of the customer; providing a compensation code to the customer; providing to the customer a voucher that is redeemable for a benefit from the vending machine; providing to the customer a voucher that is redeemable for a benefit from another vending machine; and providing to the customer a voucher that is redeemable for a product from a retail store (Fig. 1 & 4; Col. 2, Line 65-Col. 3, Line 7, discloses a product identifier (i.e. compensation code) being provided to the purchaser to be used by the purchaser to receive the substitute product).

As per Claim 20, Walker et al. discloses the providing of the resolution comprising: providing an offer for a second product other than the first product indicated by the request (Abstract, discloses providing a purchaser a substitute product (i.e. second product) when a particular product selected by a purchaser is unavailable).

As per Claim 21, Walker et al. discloses determining a customer service issue (Col. 2, Line 65-Col. 3, Line 7, discloses determining whether the product requested by the customer is available, if it is determined that the product is unavailable a customer issue exists).

However, Walker et al. fails to explicitly disclose the customer issue being due to the customer not following instructions and not providing a resolution due to the customer not following instructions.

Examiner takes Official Notice that it is well known in the art of vending machine that when using a vending machine, if a customer mistakenly enters the wrong product

code for a product desired by the customer (i.e. failing to follow instructions) then the product the customer is dispensed and the customer is not given the opportunity to enter the correct product code. For example, vending machine providing snacks allow a customer to enter a code but do not offer a "confirm option" or a delete option when entering the product code in order to correct a product code that has been entered incorrectly.

As per Claim 22, Walker et al. discloses receiving the input from the customer via a microphone of the vending machine; and recording audio input received via the microphone (Col. 5, Lines 1-12, discloses receiving input from a purchaser via a voice recognition device (i.e. a microphone)) and storing the information received).

As per Claim 25, Walker et al. discloses recording data associated with the customer service issue (Col. 11, Line 24-Col. 12, Line 17, discloses storing (i.e. recording) data pertaining the a product selected by a purchaser and data pertaining to products that have been offered to a purchaser to substitute the product originally requested by the purchaser); and determining a unique identifier for the customer service issue (Col. 12, Lines 18-35, discloses determining a product identifier that is to be presented to a purchaser in order to resolve a customer service issue).

As per Claim 26, Walker et al. discloses determining the resolution further based on the recorded data (Col. 11, Lines 46-64, discloses determining a substitute product to offer a purchaser based on data stored on the suggestive sell database); and communicating an indication of the determined resolution to the customer (Col. 12, Lines 18-28, discloses displaying to a purchaser the substitute product).

As per Claim 27, Walker et al. discloses receiving, via the customer interface of the vending machine and from the customer, information which identifies the customer (Col. 6, Lines 23-34, discloses a detector that detects a presence of a purchaser when he or she is in proximity of the vending machine and outputs a signal indicative of the presence of the purchaser).

As per Claim 28, Walker et al. discloses outputting, to the customer, the unique identifier (Col. 12, Lines 18-35, discloses displaying to the purchaser the product identifier corresponding to the suggested substitute product).

As per Claim 29, Walker et al. discloses displaying an alphanumeric code indicative of a malfunction of the vending machine that caused the customer service issue (Figs. 3-6, discloses the product identifier being an alphanumeric code (i.e. A1, A2, A3)).

8. Claims 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of PTS: Vending Machine Refund System (May 02, 2004); herein after known as "PTS").

As per Claim 9, the Walker et al. and Kolls combination discloses the claimed invention as applied to Claim 8, above. However, the combination fails to explicitly disclose providing a plurality of selectable menu options; and receiving an election of at least one of the menu options.

PTS discloses an online vending refund system with the concept of providing a plurality of selectable menu options, each of which defines at least one customer service issue (discloses a vending refund form that a customer fill out, wherein the form

contains selectable menu options via a drop down list to identify the date that the customer service issue occurred, the vending machine that created the issue (via machine type), and the reason for the issue (via a reason for refund request)); and receiving, from the customer, a selection of at least one of the menu options, thereby defining an indication of a customer service issue (discloses the customer filling out the vending refund form including selecting from the menu option and submitting the form via online).

Therefore, from the teaching of PTS, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al. and Kolls combination to include providing a plurality of selectable menu options defining a customer service issue; and receiving, from the customer a selection of at least one of the menu options as taught by PTS in order to identify trends for certain vending machines in relation to malfunctions.

9. Claim 10 is rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of PTS: Vending Machine Refund System (May 02, 2004); herein after known as "PTS") and Whitten et al. (7,286,901).

As per Claim 10, PTS discloses defining a plurality of selectable menu options (discloses a vending refund form that a customer fill out, wherein the form contains selectable menu options via a drop down list to identify the date that the customer service issue occurred, the vending machine that created the issue (via machine type), and the reason for the issue (via a reason for refund request)). However, the Walker et

al., Kolls, and PTS combination fails to explicitly disclose determining diagnostic data of the vending machine.

Whitten et al. discloses a vending system with the concept of determining, by at least one sensor of the vending machine, diagnostic data of the vending machine (Col. 3, Lines 30-52, discloses determining whether a product the light continuity and prevents a portion of the light from reaching at least one detector on the opposite side of the monitoring path, wherein the logic circuit on the detecting arm will note the monetary blockage of the light and report it as a delivery of the product).

Therefore, from the teaching of Whitten et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al., Kolls, and PTS combination to include determining diagnostic data of the vending machine as taught by Whitten et al. in order to tailor the options providing to the customer in regards to a customer service issue specifically to the current situation and minimize the selection options to make it easier and more efficient for the customer to use.

10. Claims 11 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of Wittern, Jr. et al. (6,772,906).

As per Claim 11, the Walker et al. and Kolls combination discloses the claimed invention as applied to Claim 7, above. However, the combination fails to explicitly disclose determining, by the vending machine, that the vending machine has malfunctioned.

Wittern, Jr. et al. discloses a method for vending from a vending machine with the concept of determining, by the vending machine, that the vending machine has malfunctioned (Col. 4, Lines 52-59, via if a product is not sensed by the time the motor reaches the home position during the second vend cycle, a signal can be created which can activate an indicator of a malfunction in regards to the vending machine).

Therefore, from the teaching of Wittern, Jr. et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al. and Kolls combination to include determining, by the vending machine, that the vending machine has malfunctioned as taught by Wittern, Jr. et al. in order to aid in compensating a customer when a vending machine has malfunction in order to ensure customer satisfaction.

As per Claim 18, Walker et al. discloses prompting, by the vending machine, the customer to verify information regarding the vending machine malfunction (Col. 12, Lines 18-35, via prompting the purchaser to enter the product identifier of the substitute product in order to indicate acceptance of the resolution to the vending machine malfunction); and receiving, via the customer interface of the vending machine and from the customer, a response to the prompt (Col. 12, Lines 18-35, discloses receiving the product identifier entered by the purchaser).

11. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of Wittern, Jr. et al. (6,772,906) and Peters (5,769,269).

As per Claim 12, the Walker et al., Kolls, and Wittern, Jr. et al. disclose the claimed invention as applied to Claim 11, above. However, the combination fails to explicitly disclose the vending machine dispensing the wrong product.

Peters discloses a vending system with the concept of the vending machine dispensing the wrong product (Col. 9, Lines 12-18, discloses the vending the wrong product to a customer).

Therefore, from the teaching of Peters, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al., Kolls, and Wittern, Jr. et al. combination to include the vending machine dispensing the wrong product as taught by Peters in order to compensate a customer for all vending machine malfunction in order to ensure customer satisfaction.

12. Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of Wittern, Jr. et al. (6,772,906) and LeMay et al. (US 2003/0176213).

As per Claim 13, the Walker et al., Kolls, and Wittern, Jr. et al. combination discloses the claimed invention as applied to Claim 11, above. However, the combination fails to explicitly disclose a failure of the vending machine to perform one or more of: (i) a playing of a movie trailer; (ii) a playing of a game; (iii) a rendering of a game result; and (iv) a playing of an audio file.

LeMay et al. discloses virtual gaming peripherals for a gaming machine with the concept of a failure of the vending machine to perform one or more of: (i) a playing of a movie trailer; (ii) a playing of a game; (iii) a rendering of a game result; and (iv) a playing

of an audio file (Fig. 2; [0064] discloses the gaming machine comprising a virtual vending machine 128. [0115] discloses the gaming machine failure to properly credit a user for an award for a game outcome due to the gaming machine malfunctioning.).

Therefore, from the teaching of LeMay et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al., Kolls, and Wittern, Jr. et al. combination to include a failure of the vending machine to perform one or more of: (i) a playing of a movie trailer; (ii) a playing of a game; (iii) a rendering of a game result; and (iv) a playing of an audio file as taught by LeMay et al. in order to be able to resolve customer issues involving all forms of vending machines such as gaming machines.

13. Claims 14 and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of Wittern, Jr. et al. (6,772,906) and Blad (6,675,067).

As per Claim 14 and 15, Walker et al. discloses a system for collecting vending machine information comprising: a coin acceptor that detects the amount of money received from coinage deposited into a dispensing device; a card reader that receives electronic currency from a card and applies a charge against the card for a product selected and dispensed by a dispensing device; and a bill validator that accepts and determines an amount of money received from monetary bills deposited into a dispensing device (Col. 5, Line 57-Col. 6, Line 7). However, the Walker et al., Kolls, and Wittern, Jr. et al. combination fails to explicitly disclose the vending machine not having processed payment correctly.

Blad discloses a computer network based coin-operated machine monitoring system with the concept of the vending machine not having processed payment correctly (Col. 1, Lines 18-48, discloses the vending machine malfunctioning via coin or bill providing by the customer jams in the vending machine).

Therefore, from the teaching of Blad, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al., Kolls, and Wittern, Jr. et al. combination to include the vending machine not having processed payment correctly as taught by Blad in order to aid in resolving customer issues in order to ensure customer satisfaction; and identify machine issues and resolve the issues in order to aid in increasing revenue.

14. Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of Wittern, Jr. et al. (6,772,906), Blad (6,675,067), and PTS: Vending Machine Refund System (May 02, 2004; herein after known as "PTS").

As per Claim 16, the Walker et al., Kolls, Wittern, Jr. et al., and Blad combination discloses the claimed invention as applied to Claim 14, above. However, the combination fails to explicitly disclose the vending machine not having properly dispensed payment that is due to the customer.

PTS discloses an online vending refund system with the concept of the vending machine not having properly dispensed payment that is due to the customer (Page 2, discloses a customer requesting a refund due to the vending machine refund button not working resulting in a failure to provide a refund due to a customer).

Therefore, from the teaching of Whitten et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al., Kolls, Wittern, Jr. et al., and Blad combination to include the vending machine not having properly dispensed payment that is due to the customer as taught by PTS in order to identify trends for certain vending machines in relation to malfunctions.

15. Claims 23, 24, and 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Kolls (6,606,602) and in further view of Whitten et al. (7,286,901).

As per Claim 23, the Walker et al. and Kolls combination discloses the claimed invention as applied to Claim 7, above. However, the combination fails to explicitly disclose determining that the customer service issue comprises a jammed dispensing row of the vending machine.

Whitten et al. discloses a vending system with the concept of determining that the customer service issue comprises a jammed dispensing row of the vending machine (Abstract; Col. 7, Lines 55-67, discloses determining whether a blockage (i.e. jammed dispensing row) has occurred causing the vending machine to malfunction).

Therefore, from the teaching of Whitten et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al. and Kolls combination to include determining that the customer service issue comprises a jammed dispensing row of the vending machine as taught by Whitten et al. in order to identify and resolve issues related to the vending machines and ensure customer satisfaction.

As per Claim 24, Walker et al. discloses marking a product as "empty" when a product selected by a purchaser has failed to dispense in order to prevent future vend attempts (Col. 3, Lines 3-20). Whitten et al. discloses the concept of a product being jammed (Abstract; Col. 7, Lines 55-67). However, the Walker et al., Kolls, And Whitten et al. combination fails to explicitly disclose altering a product display window to impede view of the product stored in the jammed row by the customer.

Examiner asserts it would have been obvious to one of ordinary skill in the art at the time the invention was made to impede the view of a product stored in a jammed row in order to prevent future vend attempts.

As per Claim 30, the Walker et al. and Kolls combination discloses the claimed invention as applied to Claim 25, above. However, the combination fails to explicitly disclose determining and recording diagnostic data of the vending machine.

Whitten et al. discloses a vending system with the concept of determining diagnostic data of the vending machine (Col. 3, Lines 30-52, discloses determining whether a product the light continuity and prevents a portion of the light from reaching at least one detector on the opposite side of the monitoring path, wherein the logic circuit on the detecting arm will note the momentary blockage of the light and report is as a delivery of the product); and recording the diagnostic data (Fig. 8, via recording failure to deliver a product (814)).

Examiner asserts the type of diagnostic data being acquired hold little, if any, patentable weight in the method claim. Examiner asserts the type of data being acquired does not change or alter the method step of determining diagnostic data.

Examiner asserts Whitten et al. is fully capable of having diagnostic data include at least one digital image of at least one vending machine component since the type of diagnostic data does not affect the method step of determining diagnostic data.

Therefore, from the teaching of Whitten et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Walker et al. and Kolls combination to include determining and recording diagnostic data of the vending machine as taught by Whitten et al. in order to identify and resolve issues relating to the vending machine and ensure customer satisfaction.

16. Claims 31-38 are rejected under 35 U.S.C. 103(a) as being unpatentable over Walker et al. (6,324,520) in view of Joshi (US 2002/0099662).

As per Claim 31, Walker et al. discloses a vending machine, comprising:
a processor (Fig. 1, Col. 4, Lines 51-67, via central processing unit); and
a memory in communication with the processor, the memory storing instructions (Fig. 1, Col. 4, Lines 51-67, via the central processing unit being connected to an random access memory, read-only memory; wherein the memory stores processing instructions for the operation of the dispensing device) that when executed by the processor cause the vending machine to:

receive an indication of a customer service issue at the vending machine (Col. 2, Line 65-Col. 3, Line 7, discloses determining whether the product requested by the customer is available, if it is determined that the product is unavailable a customer issue exists);

select one of a plurality of available remedies to provide to the customer (Col. 7, Line 24-Col. 8, Line 2, discloses determining what product should be offered as a resolution to the purchaser based on criterion such as the average demand rate, which product is due to be restocked at the earliest date, or which product will expire at the earliest date); and

provide, to the customer, a compensation code indicative of the selected remedy (Figs 3-6; Col. 12, Lines 18-35, discloses displaying to the purchaser the product identifier corresponding to the suggested substitute product, wherein the product identifier is an alphanumeric code).

However, Walker et al. fails to explicitly disclose the vending machine in communication with a wireless handheld customer device.

Joshi discloses a method and system for purchasing goods from a vending machine utilizing a wireless device with the concept of the vending machine in communication with a wireless handheld customer device (Abstract, discloses utilizing a wireless device to receive and transmit data to and from a vending machine).

Therefore, from the teaching of Joshi, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and system for collecting and applying vending machine demand information of Walker et al. to include the vending machine in communication with a wireless handheld customer device as taught by Joshi in order to aid in remotely providing access to the vending machine.

As per Claim 32, Walker et al. discloses a printer that provides the compensation code via a printed voucher (Col. 5, Lines 13-28, via the output device being a printer for broadcasting messages to a purchaser, wherein a message includes (Col. 12, Lines 18-35) a product identifier corresponding to the suggested substitute product, wherein the product identifier being an alphanumeric code).

Examiner Asserts: While features of an apparatus may be recited either structurally or functionally, claims directed to an apparatus must be distinguished from the prior art in terms of structure rather than function. See MPEP 2114; *In re Schreiber*, 128 F.3d 1473, 1477-78, 44 USPQ2d 1429, 1431-32 (Fed. Cir. 1997).

As per Claim 33, the Walker et al. and Joshi combination discloses the claimed invention as applied to Claim 32, above. However, the combination fails to explicitly disclose the printed voucher comprising a barcode indicative of the compensation code.

Examiner asserts the type of data contained on the printed voucher holds little, if any, patentable weight in the system claim. The type of data contained on the printed voucher does not alter or change the structure of the system claimed (i.e. the printer). Examiner asserts Walker et al. is fully capable of providing a barcode indicative of the compensation code.

As per Claim 34, Walker et al. discloses the claimed invention as applied to Claim 31, above. However, Walker et al. fails to explicitly disclose transmitting an indication of the compensation code to the wireless handheld device operated by the customer of the vending machine.

Joshi discloses a method and system for purchasing goods from a vending machine utilizing a wireless device with the concept of transmitting an indication of the compensation code to the wireless handheld device operated by the customer of the vending machine (Abstract, via providing a code related to the item from the machine to the wireless device).

Therefore, from the teaching of Joshi, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and system for collecting and applying vending machine demand information of Walker et al. to include transmitting an indication of the compensation code to the wireless handheld device operated by the customer of the vending machine in order to aid in remotely providing access to the vending machine.

As per Claim 35, Walker et al. discloses the claimed invention as applied to Claim 34, above. However, Walker et al. fails to explicitly disclose the transmitting being conducted via one or more of: (i) electronic mail; (ii) text messaging; and (iii) infrared radiation.

Joshi discloses a method and system for purchasing goods from a vending machine utilizing a wireless device with the concept of the transmitting being conducted via one or more of: (i) electronic mail; (ii) text messaging; and (iii) infrared radiation ([0011] discloses the wireless device communicating with the vending machine via an infrared signal).

Therefore, from the teaching of Joshi, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and

system for collecting and applying vending machine demand information of Walker et al. to include the transmitting being conducted via one or more of: (i) electronic mail; (ii) text messaging; and (iii) infrared radiation as taught by Joshi in order to aid in remotely providing access to the vending machine.

As per Claim 36, Walker et al. discloses the vending machine receiving an indication of the compensation code (Col. 11, Line 59-Col. 12, Line 17, discloses receiving a substitute product identifier if the product selected by the purchaser is out of stock); and providing the remedy to the customer (Col. 11, Line 59-Col. 12, Line 35, discloses providing the substitute product identifier to the purchaser).

However, Walker et al. fails to explicitly disclose the vending machine being in communication with a wireless handheld customer device.

Joshi discloses a method and system for purchasing goods from a vending machine utilizing a wireless device with the concept of the vending machine in communication with a wireless handheld customer device (Abstract, discloses utilizing a wireless device to receive and transmit data to and from a vending machine).

Therefore, from the teaching of Joshi, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and system for collecting and applying vending machine demand information of Walker et al. to include the vending machine in communication with a wireless handheld customer device as taught by Joshi in order to aid in remotely providing access to the vending machine.

As per Claim 37, Walker et al. discloses the claimed invention as applied to Claim 36, above. However, Walker et al. fails to explicitly disclose receiving of the indication of the compensation code from the wireless handheld customer device, comprises one or more of: (i) reading information indicative of the compensation code from a display screen of the wireless handheld customer device operated by the customer of the vending machine; (ii) detecting a DTMF signal transmitted by a speaker of the wireless handheld customer device operated by the customer of the vending machine, wherein the DTMF signal is indicative of the compensation code; and (iii) receiving a wireless signal from the wireless handheld customer device operated by the customer of the vending machine, wherein the wireless signal is indicative of the compensation code.

Joshi discloses a method and system for purchasing goods from a vending machine utilizing a wireless device with the concept of receiving of the indication of the compensation code from the wireless handheld customer device, comprises one or more of: (i) reading information indicative of the compensation code from a display screen of the wireless handheld customer device operated by the customer of the vending machine; (ii) detecting a DTMF signal transmitted by a speaker of the wireless handheld customer device operated by the customer of the vending machine, wherein the DTMF signal is indicative of the compensation code; and (iii) receiving a wireless signal from the wireless handheld customer device operated by the customer of the vending machine, wherein the wireless signal is indicative of the compensation code

[[0011-0012] via receiving a code from a wireless device operated by a customer via a wireless signal).

Therefore, from the teaching of Joshi, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and system for collecting and applying vending machine demand information of Walker et al. to include receiving a wireless signal from the wireless handheld customer device operated by the customer of the vending machine, wherein the wireless signal is indicative of the compensation code as taught by Joshi in order to aid in remotely providing access to the vending machine.

As per Claim 38, Walker et al. discloses the claimed invention as applied to Claim 31, above. However, Walker et al. fails to explicitly disclose the wireless handheld customer device comprising one or more of: (i) a cellular telephone; (ii) a PDA device; (iii) a pager; (iv) a personal music player; (v) a gaming device; and (vi) a personal computer.

Joshi discloses a method and system for purchasing goods from a vending machine utilizing a wireless device with the concept of the wireless handheld customer device comprising one or more of: (i) a cellular telephone; (ii) a PDA device; (iii) a pager; (iv) a personal music player; (v) a gaming device; and (vi) a personal computer ([0010] via the wireless device comprising a PDA device; cell phone; laptop; and a notebook).

Therefore, from the teaching of Joshi, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method and

system for collecting and applying vending machine demand information of Walker et al. to include the wireless handheld customer device comprising one or more of: (i) a cellular telephone; (ii) a PDA device; (iii) a pager; (iv) a personal music player; (v) a gaming device; and (vi) a personal computer as taught by Joshi in order to aid in remotely providing access to the vending machine.

17. Claim 45 is rejected under 35 U.S.C. 103(a) as being unpatentable over Peters (5,769,269) in view of Walker et al. (6,324,520) and in further view of Kolls (6,606,602).

As per Claim 45, Peters discloses wherein the diagnostic data includes an indication of whether there is a product jam at the vending machine (Col. 15, Line 17-Col. 16, Line 51, discloses providing information about a fault condition (i.e. a product jam), and wherein the resolution is determined automatically by the remote customer service device operated by the customer service representative based on at least one stored rule for determining the resolution and whether there is a product jam at the vending machine (Col. 15, Line 17-Col. 16, Line 51, discloses determining a resolution when a fault condition has occurred (i.e. product jam), wherein the resolution is determined automatically by the vending machine controlled by a CSR wherein the resolution is determined based on the form a payment provided by the customer, if the customer paid using a credit card, a refund will be credited to the card. If the customer paid by cash, the customer will be offered a different product or mailed a refund).

However, Peters fails to explicitly disclose the concept of the resolution being determined based on the indication of an average actual items velocity for other

products in the same category; and the indication of the coin inventory of the vending machine.

Walker et al. discloses a method for collecting and applying vending machine demand information with the concept of an indication of an average actual item velocity for other products in the same category (Col. 7, Lines 30-41, discloses the suggestive sell (i.e. resolution) criterion may be a requirement that the average demand for a product associated with the criterion is below a certain average demand rate).

Therefore, from the teaching of Walker et al., it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the vending system of Peters to include an indication of an average actual items velocity for other products in the same category as taught by Walker et al. in order to determine an adequate alternative or substitute product to provide to a customer in order to ensure customer satisfaction.

Kolls discloses a vending machine control system with the concept of an indication of the coin inventory of the vending machine (Col. 2, Lines 29-44, discloses the concept of the coin inventory of a vending machine being depleted. Col. 23, Line 52-Col. 24, Line 13, discloses determining that an issue exists such as "out of supplies" (i.e. coin inventory depleted) and taking action to correct the problem).

Therefore, from the teaching of Kolls, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Peters and Walker et al. combination to include an indication of the coin inventory of the vending

machine as taught by Kolls in order to aid in properly compensating a customer for the money owed to the customer and promoting customer satisfaction.

Response to Arguments

18. Applicant's arguments filed April 22, 2011 have been fully considered but they are not persuasive.

As per Claim 39, Applicant argues that Peters fails to disclose a resolution is based on at least one of : an identity of the customer and an assessed value of the customer. Examiner respectfully disagrees. Peters discloses a resolution being determined based on whether the customer is identified as a customer paying with a credit card or a customer paying with cash (via Col. 15, Lines 27-55).

As per Claims 1-7 and 9-38, Applicant argues that the Examiner has failed to establish a prima facie case of obviousness for claims 1-7, and 9-38. Examiner respectfully disagrees. Examiner asserts a suggestion or motivation to combine references is an appropriate method for determining obviousness, however it is just one of a number of valid rationales for doing so. The Court in KSR identified several exemplary rationales to support a conclusion of obviousness which are consistent with the proper "functional approach" to the determination of obviousness as laid down in Graham. KSR, 82 USPQ2d at 1395-97. See MPEP § 2141 and § 2143. First, Examiner asserts that that the scope and content of the prior art was determined wherein the rejection provides the scope of each cited prior art reference. Second, Examiner asserts that the differences between the prior art and the claims were stated in the rejection

above; wherein Examiner clearly points out the claim limitations that are disclosed in the prior art and the claim limitations the prior art fails to disclose. Thirdly, Examiner has resolved the level of ordinary skill in the pertinent art. Examiner asserts If the only facts of record pertaining to the level of skill in the art are found within the prior art of record, the court has held that an invention may be held to have been obvious without a specific finding of a particular level of skill where the prior art itself reflects an appropriate level. *Chore-Time Equipment, Inc. v. Cumberland Corp.*, 713 F.2d 774, 218 USPQ 673 (Fed. Cir. 1983). See also *Okajima v. Bourdeau*, 261 F.3d 1350, 1355, 59 USPQ2d 1795, 1797 (Fed. Cir. 2001).

Examiner asserts The Supreme Court in *KSR International Co. v. Teleflex Inc.*, 82 USPQ2d 1385, 1395-97 (2007) identified a number of rationales to support a conclusion of obviousness which are consistent with the proper "functional approach" to the determination of obviousness as laid down in *Graham*. The key to supporting any rejection under 35 U.S.C. 103 is the clear articulation of the reason(s) why the claimed invention would have been obvious. The Supreme Court in *KSR* noted that the analysis supporting a rejection under 35 U.S.C. 103 should be made explicit. One rationale is combining prior art elements according to known methods to yield predictable results. Examiner asserts this rationale was applied for the rejections stated above. For example, as per Claims 1-4, Examiner asserts it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the known feature of resolving a customer service issue in regards to a vending machine as taught by *Walker et al.* with the known feature of providing a customer with a selectable menu

option to identify the customer service issue as taught by PTS in order to provide the predictable result of identifying and rectifying a customer service issue in regards to a vending machine malfunction.

As per Claims 1-7 and 9-38, Examiner asserts Applicant's arguments do not comply with 37 CFR 1.111(c) because they do not clearly point out the patentable novelty which he or she thinks the claims present in view of the state of the art disclosed by the references cited or the objections made.

Conclusion

19. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

20. Any inquiry concerning this communication or earlier communications from the examiner should be directed to FONYA LONG whose telephone number is (571)270-5096. The examiner can normally be reached on Mon-Thurs. 7:30am-6pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Janice Mooneyham can be reached on (571) 272-6805. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/FONYA LONG/
Examiner, Art Unit 3689

/Janice A. Mooneyham/

Supervisory Patent Examiner, Art Unit 3689

